

IN THE UNITED STATES DISTRICT COURT
FOR THE DISTRICT OF DELAWARE

BASF CORPORATION,)	
)	
Plaintiff,)	
)	
v.)	Civ. No. 14-1204-SLR-SRF
)	
JOHNSON MATTHEY INC.,)	
)	
Defendant.)	

MEMORANDUM ORDER

At Wilmington this ~~On~~^{On} day of February, 2016, having heard argument on, and having reviewed the papers submitted in connection with, the parties' proposed claim construction;

IT IS ORDERED that the disputed claim language of U.S. Patent No. 8,524,185 ("the '185 patent") shall be construed consistent with the tenets of claim construction set forth by the United States Court of Appeals for the Federal Circuit in *Phillips v. AWH Corp.*, 415 F.3d 1303 (Fed. Cir. 2005), as follows:

1. **"monolithic catalyst substrate"**¹ / **"monolithic substrate:"**² "Catalyst substrate formed as a single piece of material." Claim 1 recites "the system comprising: at least one monolithic catalyst substrate having an inlet end and an outlet end" (19:43), indicating that while a system may comprise more than one monolithic catalyst substrate, each substrate is a single piece of material with two ends. Overall, the

¹ Found in claim 1.

² Found in claims 1, 2, and 4.

language and context of the claim would be nonsensical if a monolithic substrate referred to multiple pieces of material, particularly given the identification of “an inlet end” and “an outlet end.” (19:42-43) The claim describes a single piece of material coated with an undercoat washcoat layer on the outlet end and an overcoat washcoat layer over the total length of the substrate, supporting the notion of a single piece of material. Additionally, dependent claims 2 and 4 refining the substrate further indicate that it is formed as a single piece of material.

2. Turning to the specification, a “catalyst system” is defined as including “two or more chemical catalytic functions on one substrate or on more than one separate substrate.” (1:64-67) Nothing in the specification, claim language, or proffered extrinsic evidence indicates that a plurality of catalytic functions cannot coexist on a single piece of material. Further, one embodiment specifies that “the substrate is a single monolithic substrate. The monolithic substrate can be a flow-through honeycomb substrate comprising a plurality of fine, substantially parallel gas flow passages extending along the longitudinal axis of the substrate.” (1:11-15) Contrary to defendant’s assertion, this language indicates that the patentee intended that the substrate consist of one piece of material. The specification is additionally devoid of any suggestion that a substrate could be characterized as a single unit rather than a single piece of material.

3. **“an overcoat washcoat layer coated over a total length of the monolithic substrate from the inlet end to the outlet end”³ / “an overcoat washcoat layer coated over a total length of the honeycomb substrate from the**

³ Found in claim 1.

inlet end to the outlet end of the substrate:⁴ “A compositionally distinct material coated over a total length of the monolithic substrate from the inlet end to the outlet end” and “a compositionally distinct material coated over a total length of the honeycomb substrate from the inlet end to the outlet end of the substrate.” The term “washcoat layer” is defined in the specification as consisting “of a compositionally distinct layer of material disposed on the surface of the monolithic substrate or an underlying washcoat layer.” (5:10-15) The calcination process referred to in plaintiff’s proposed construction does not appear in any of the claims. Rather, the concept of calcination is discussed in the patent as an option, but not strictly as a requirement for forming the washcoat layer. For instance, the specification recites “processing steps **may** include fixation by an acidic component ... or a basic component ..., chemical reduction, **or** calcination” (9:30-33) (emphasis added), and “[t]he resulting copper-containing molecular sieve **may** also be calcined to fix the copper” (10:4-5) (emphasis added). Inclusion of the word “may” indicates that the patentee intended calcination as one of several available options in forming the washcoat layer. To require calcining coatings together would improperly import claim limitations from the specification. *Superguide Corp. v. DirecTV Enterprises, Inc.*, 358 F.3d 870, 875 (Fed. Cir. 2004) (“[I]t is important not to import into a claim limitations that are not part of the claim. For example, a particular embodiment appearing in the written description may not be read into a claim when the claim language is broader than the embodiment.”).⁵

⁴ Found in claim 17.

⁵ The court declines at this time to determine whether a washcoat layer requires a uniform loading across the length of the substrate.

4. **“material composition A effective for catalyzing NH₃ oxidation”⁶ / “material composition B effective to catalyze selective catalytic reduction (SCR) of NO_x”⁷ / “material composition further effective to catalyze SCR of NO_x”⁸ / “a material composition B free from precious metal effective for catalyzing selective catalytic reduction (SCR) of NO_x.”⁹** Indefinite under 35 U.S.C. § 112, ¶ 2. The definiteness requirement is rooted in § 112, ¶ 2, which provides that “the specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.” “A determination of claim indefiniteness is a legal conclusion that is drawn from the court's performance of its duty as the construer of patent claims.” *Personalized Media Comm., LLC v. Int'l Trade Com'n*, 161 F.3d 696, 705 (Fed. Cir. 1998). Reiterating the public notice function of patents, the Supreme Court recently explained that “a patent must be precise enough to afford clear notice of what is claimed, thereby ‘appris[ing] the public of what is still open to them.’ ” *Nautilus, Inc. v. Biosig Instruments, Inc.*, — U.S. —, 134 S.Ct. 2120, 2129 (2014) (citations omitted). In balancing the need for clarity with the inherent limitations of the English language, 35 U.S.C. § 112, ¶ 2 requires “that a patent's claims, viewed in light of the specification and prosecution history, inform those skilled in the art about the scope of the invention with reasonable certainty.” *Id.*

5. Claim 1 recites an undercoat washcoat layer containing a “material composition A effective for catalyzing NH₃ oxidation” and an overcoat washcoat layer

⁶ Found in claim 1.

⁷ Found in claim 1.

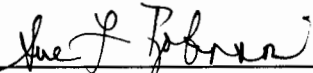
⁸ Found in claim 5.

⁹ Found in claim 17.

containing “a material composition B effective to catalyze selective catalytic reduction (SCR) of NO_x.” (9:41-47) Claim 5 recites “a material composition further effective to catalyze SCR of NO_x.” (20:3-5) Claim 17 recites an overcoat washcoat layer containing “a material composition B free from precious metal effective for catalyzing selective catalytic reduction (SCR) of NO_x.” (20:42-62) Each claim fails to limit the “material composition A” or the “material composition B” to any specific materials. Rather than explicitly defining the material compositions, the claims utilize functional language, specifically “effective,” to purportedly define them. In other words, the claims recite a performance property the composition must display, rather than its actual composition. Moreover, none of the claims recite a minimum level of function needed to meet this “effective” limitation nor a particular measurement method to determine whether a composition is “effective” enough to fall within the claims.¹⁰ Without such information, a person of ordinary skill in the art could not determine which materials are within the “material composition A” or “material composition B” limitation, and which are not. *Nautilus*, 134 S. Ct. at 2129 (“a patent must be precise enough to afford clear notice of what is claimed, thereby appris[ing] the public of what is still open to them”). Lacking sufficient detail defining “material composition A” and “material composition B,” the court concludes that the disputed limitations are not “precise enough to afford clear notice of what is claimed” and do not provide reasonable certainty as to the scope of the invention. *Id.*

¹⁰ The court additionally notes that “a practically limitless number of materials” exist that would “catalyze SCR of NO_x, even within the normal operating conditions of an exhaust aftertreatment system,” indicating that the claims, as written, fail to sufficiently identify the material compositions. (D.I. 102 at ¶ 22)

6. The court has provided a construction in quotes for the claim limitations at issue. The parties are expected to present the claim construction to the jury consistently with any explanation or clarification herein provided by the court, even if such language is not included within the quotes.



United States District Judge